снартек 17 *Fibonacci*

Extended Fibonacci Time Ratios

In Chapter 10, we discussed applying Fibonacci to the price action of the chart for extensions. This concept can also be applied to TIME to attempt a prediction of a time in the future when a trend should change direction.



Figure 17-1: Extended Fibonacci Time Ratios

The general idea is to take the initial time between two Primary or Major Pivots. These pivots can be identified by the user or from the labels generated by the software from the Pivots Menu.

This initial time is extended to the future using various Fibonacci ratios. We suggest 1.62 and 2.62. However, you can use any combination. If you do not like the preset ratios we have added, you can enter your own values, such as 3.79, 2.94, etc.

The theory is to look for a potential change in trend at these future extended time periods.



Figure 17-2: Fibonacci Time Segments

Fibonacci Time Clusters

Take the time distance (number of bars) between two pivots and extend (project) ratios of this time distance to the future. You will notice that many of the future pivots (change in trend points) occur at these extended time periods.

Question:

What ratios should I use? Do I use all the pivots or just the Primary and Major ones? Do I use High to High swings or Low to Low swings?

Answer:

A very large number of traders use this method. However, each trader uses different ratios, different sets of pivots, and different types of swings. You can basically use any combination and still obtain accurate projections some of the time. From our research, we have not found any one combination that works best all the time.



Figure 17-3: Fibonacci Time Clusters

Question:

Then how does one use this technique?

Answer:

Use all reasonable combinations, and look for a group of Clusters. Let's assume numerous traders are using this study, each using different ratios, pivots, etc. Regardless of which combination is used, the collective projections of all traders will result in certain areas where a majority of the traders will get a **change in trend projection**.



Figure 17-4: Fibonacci Time Clusters

Fibonacci Time Clusters

Example

Figure 17-5 shows the Daily S&P Cash. The Time Clusters were generated by using the following:

- # All Primary and Major Pivots
- # Fibonacci Time extensions of 1.62 and 2.62 with 100 % weighting
- # High to High Swings plus Low to Low swings
- # Minimum 10 bars in between pivots
- # Maximum 100 bars in between pivots



Figure 17-5: S&P Cash

Fibonacci Extension Price Clusters

Fibonacci extensions and retracement levels are used by just about every trader. Sure they may all have their own unique methods of applying them, or their own secret Fibonacci ratios.

Regardless of the numerous methods used, the collective projections of all traders will result in certain price levels where a majority of the traders will get the same support or resistance projections. The software can identify such collective levels by way of Clustering.



Figure 17-6: Extension Price Clusters

Example

Figure 17-7 shows an AOL Daily Chart. The Fibonacci Price Extensions were generated by using the following:

- All Primary and Major Pivots
- Fibonacci Price extensions of 1.62, 2.62 and 4.25 with 100% weighting using Rallies.



Figure 17-7: Daily Chart, AOL

Projection:

The initial cluster of \$16.25 was projected by the software.

Result:

The actual high of AOL was at \$17.



Figure 17-8: Daily Chart, AOL

Fibonacci Retracement Price Clusters

Just like the extensions, traders all around the world use Fibonacci Price Retracement levels to determine support and resistance levels. Different traders use different retracement levels and also calculate from different swing levels.

Regardless of the numerous methods used, the collective projections of all traders will result in certain price levels where a majority of the traders will get the same support or resistance projections. The software can identify such collective levels by way of Clustering.



Figure 17-9: Retracement Price Clusters

Fibonacci Retracement Price Clusters

Figure 17-10 shows a daily chart for Jan 2003 Crude Oil. The Fibonacci Price Retracements were generated by using:

- All Primary and Major Pivots
- Fibonacci Price retracements of 38%, 50%, 62% and 75% with 100% weighting using Declines



Figure 17-10: Daily Chart, Jan 2003, Crude Oil

Projection:

The initial cluster of 2400 was projected in early October.

Result:

The market retraced back to 2400 in November.



Figure 17-11: Daily Chart, Jan 2003, Crude Oil

Retracements, Extensions and Elliot Extension Buttons

Three different types of Price Clusters can be calculated. They are graphically displayed below:



Figure 17-12: Types of Price Clusters

Retracement of Fibonacci Extension added Fibonacci Extensions added to Swing Range on to the end of the Swing the end of a Retracement. These are normal Elliot Wave-

These are normal Elliot Wavetype extensions, as used in Waves 1, 2, 3, etc.